

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
13 October 2005 (13.10.2005)

PCT

(10) International Publication Number
WO 2005/094580 A1

(51) International Patent Classification⁷: **A01N 37/40**

(21) International Application Number:
PCT/EP2005/001924

(22) International Filing Date: 23 February 2005 (23.02.2005)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
MI2004A 000402 3 March 2004 (03.03.2004) IT

(71) Applicant (*for all designated States except US*): **ISAGRO S.P.A.** [IT/IT]; Via Caldera, 21, I-20153 Milano (IT).

(72) Inventors; and

(75) Inventors/Applicants (*for US only*): **FILIPPINI, Lucio** [IT/IT]; Via Morandi, 13/A, I-20097 San Donato Milanese (IT). **GUSMEROLI, Marilena** [IT/IT]; Via Don Valentini, 20, I-20052 Monza (IT). **MORMILE, Silvia** [IT/IT]; Via Ballario, 7, I-28100 Novara (IT). **GARAVAGLIA, Carlo** [IT/IT]; Piazza Della Vittoria, 7, I-20012 Cuggiono (IT). **MIRENNNA, Luigi** [IT/IT]; Via Gambolotta, 4, I-20139 Milan (IT).

(74) Agents: **DE GREGORI, Antonella et al.**; Ing. Barzanò & Zanardo Milano S.p.A., Via Borgonuovo, 10, I-20121 Milano (IT).

(81) Designated States (*unless otherwise indicated, for every kind of national protection available*): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SM, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (*unless otherwise indicated, for every kind of regional protection available*): ARIPO (BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

Published:

— *with international search report*

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.



WO 2005/094580 A1

(54) Title: MIXTURES AND METHODS FOR THE INDUCTION OF RESISTANCE IN PLANTS

(57) Abstract: Mixtures are described comprising two or more compounds selected from at least two of the following groups: i) salicylic acid and/or its functional analogous products (ESA), ii) promoting compounds (PRO) and iii) modulating compounds (MOD), and their use for stimulating the natural defence systems of plants and for inducing resistance in plants. The use is also described, of two or more compounds selected from at least two of the following groups: one or more compounds belonging to the ESA group and/or one or more compounds belonging to the PRO group and/or one or more compounds belonging to the MOD group, individually adopted by means of application programs which envisage alternating application, to stimulate the natural defence systems of plants and inducing resistance in plants.